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IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

In re the Application of: **HAEMATSU, Hitoshi**

Group Art Unit: **2822**

Serial No.: **10/659,337**

Examiner: **Pamela E. PERKINS**

Filed: **September 11, 2003**

P.T.O. Confirmation No.: 7094

For: **SEMICONDUCTOR DEVICE AND MANUFACTURING METHOD THEREOF**

REQUEST FOR RECONSIDERATION

Commissioner for Patents
P.O. Box 1450
Alexandria, VA 22313-1450

December 23, 2004

Sir:

In response to the Office Action dated **October 15, 2004**, Applicant respectfully requests reconsideration of the 35 USC §103(a) rejection of claims 1-3 as unpatentable over U.S. Patent 6,538,210 to Sugaya et al. (hereinafter "**Sugaya et al.**") in view of U.S. patent 6,005,474 to Takeuchi et al. (hereinafter "**Takeuchi et al.**").

Sugaya et al. discloses a circuit compartment built-in module.

The Examiner has admitted that **Sugaya et al.** fails to disclose a metal protective film covering the side surfaces of a resin insulating film, but has cited **Takeuchi et al.** for teaching this feature.

Takeuchi et al. discloses a chip-like network resistor is disclosed which is reduced in variation in resistance of terminal electrodes. A substrate (1) is formed on both ends (3, 5) with a plurality of recesses (7), at each of which a terminal electrode (17) connected to a thick-film electrode (9) is arranged. The terminal electrodes (17) each are constituted of a thin metal film

electrode layer (19) and two plated layers (21, 23). The thin metal film electrode layer (19) includes a front surface electrode section (19a) formed on a front surface (1a) of the substrate (1) so as to overlap with the thick-film electrode (9), a side surface electrode section (19b) connected to the front surface electrode section (19a) and arranged so as to entirely cover an inner surface of the recess (7) and a rear surface electrode section (19c) formed on a rear surface (1b) of the substrate (1) and connected to the side surface electrode section (19b).

In particular, the Examiner has urged that a side surface of the resin insulating film is covered with the metal protective film 15.

Applicant respectfully disagrees. Figs. 1 and 2 show that a top surface of the resin insulating film 13 is covered by the metal protective film 15. Fig. 2 does not show either film 13 or 15 extending along the sides.

The Examiner has referred to Fig. 2 of **Sugaya et al.** and has urged that "copper foil 206" corresponds to the "metal protective film" of the present invention. However, as shown in Fig. 2I of **Sugaya et al.**, the "copper foil 206" is finally patterned to form "wiring patterns 209", and it is not used for covering the entire side surfaces of "mixture plate 200" to provide protection, as in the present invention. (See column 15, line 4).

Applicant submits that **Sugaya et al.** is quite different from the present invention. The Examiner has probably considered "mixture plate 200" to correspond to either the "semiconductor chip" or the "resin insulating film" of the present invention. If so, Applicant submits that **Sugaya et al.** fails to teach, mention or suggest the present invention.

The Examiner has urged that "glass coating 13" and "protective coating 15" of **Takeuchi et al.** correspond to "resin insulating film" and "metal protective film" of the present invention, respectively. However, the "protective coating 15" is not made of metal but instead "borosilicate glass, epoxy resin, or the like" (see column 6, lines 59-60). If the "protective coating 15" were to be made of metal, electrodes 9 would be short-circuited. Therefore, it is impossible that the "protective coating 15" is made of metal.

Thus, the 35 USC §103(a) rejection should be reconsidered and withdrawn.

In view of the aforementioned remarks, a Notice of Allowance is earnestly solicited.

If, for any reason, it is felt that this application is not now in condition for allowance, the Examiner is requested to contact Applicant's undersigned attorney at the telephone number indicated below to arrange for an interview to expedite the disposition of this case.

In the event that this paper is not timely filed, Applicant respectfully petitions for an appropriate extension of time. Please charge any fees for such an extension of time and any other fees which may be due with respect to this paper, to Deposit Account No. 01-2340.

Respectfully submitted,

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